DOCUMENT RESUME

ED 135 147 EC 092 975

AUTHOR Van Nagel, Clint
TITLE Observation as a Method of Diagnosis and Prescription.
PUB DATE Aug 76
NOTE 10p.; Paper presented at the International Scientific Conference of IFLD (3rd, Montreal, Canada, August 9-13, 1976)
AVAILABLE FROM Clint Van Nagel, Department of Special Education, University of North Florida, Jacksonville, Florida 32216

EDRS PRICE MF-$0.83 HC-$1.67 Plus Postage.
DESCRIPTORS *Classroom Observation Techniques; *Diagnostic Teaching; Elementary Secondary Education; *Learning Disabilities; Observation; *Teacher Role; *Teaching Methods

ABSTRACT

The author describes a diagnostic-prescriptive approach in which teachers use observation skills to identify visual, auditory, and behavioral deficits in learning disabled students. Teachers are advised to ask themselves seven questions, including whether a real learning disability exists; where the student currently functioning in reading, arithmetic, and writing; how the student learns best; and what motivates the student. (CL)

****
* Documents acquired by ERIC include many informal unpublished *
* materials not available from other sources. ERIC makes every effort *
* to obtain the best copy available. Nevertheless, items of marginal *
* reproducibility are often encountered and this affects the quality *
* of the microfiche and hardcopy reproductions ERIC makes available *
* via the ERIC Document Reproduction Service (EDRS). EDRS is not *
* responsible for the quality of the original document. Reproductions *
* supplied by EDRS are the best that can be made from the original. *
****

ED135147

U S DEPARTMENT OF HEALTH,
EDUCATION & WELFARE
NATIONAL INSTITUTE OF
EDUCATION

THIS DOCUMENT HAS BEEN REPRODUCED EXACTLY AS RECEIVED FROM THE PERSON OR ORGANIZATION ORIGINATING IT. POINTS OF VIEW OR OPINIONS STATED DO NOT NECESSARILY REPRESENT OFFICIAL NATIONAL INSTITUTE OF EDUCATION POSITION OR POLICY

Observation as a Method of Diagnosis and Prescription

Clint Van Nagel

University of North Florida

EC092975

Running head: Observation as a Method of Diagnosis and Prescription

Observation as a Method of Diagnosis[1]

There are certain basic minimum diagnostic-prescriptive competencies that every teacher of the learning disabled should have. These competencies do not necessarily require training of a sophisticated nature. Most of the academic deficits students have can be spotted by a teacher who has been trained with the proper observational skills. For example, if a teacher sees a student consistently reversing b's and d's; p's and q's, etc., the teacher knows that the student has a visual discrimination or visual memory problem. If the teacher can identify the problem, then he can seek answers to the problem.

In the past, teachers have looked to standardized tests to identify visual and auditory and information processing deficits. They have put their faith in test scores. This resulted in a hit-and-miss type of diagnosis. In the real world of the school, the things that tests measure, and what a child does in school, often do not match up. For example, on a popular standardized auditory memory subtest, the test requires the student to remember numbers spoken to him. How often are students in school asked to repeat numbers back to a teacher? Furthermore, this particular subtest deals with immediate or short term auditory memory. What about the student's memory for auditory symbols a day or week from now? The point is, teachers need to be able to observe deficits as they occur in an academic situations. If they use test scores to identify deficits, these deficits should be verified by observation. Many times a test score will show a deficit when a deficit does not exist. In such instances a deficit is the result of the student not understanding directions.

[1]Reprints may be obtained from Clint Van Nagel, Department of Special Education, University of North Florida, Jacksonville, Florida 32216

For example, there is a popular subtest that requests a student to draw a line from the mouse to a cookie without lifting his pencil and without touching the sides of the tunnel. I have seen many teachers and diagnosticians prescribe eye-hand coordination exercies based on a low score in this subtest. Upon rechecking these students myself, I found that many of them made low scores because they did not follow the auditory directions as given. When they began the task, they forgot and lifted their pencils, or forgot that they weren't supposed to touch the sides. Some of them would draw a line beyond the cookie. All of these errors lowered the students score in eye-hand coordination. When I readministered the test, making sure they understood the directions, the "deficit" in eye-hand coordination did not appear. If I had placed blind faith in the test score, and not have observed the student's performance in school, I may have agreed with the diagnosis of an eye-hand coordination deficit.

I would like to present a model based on observation that is predicated on seven types of fundamental questions that every teacher working with Learning Disabled children should be able to answer.

The first question is: Does a real learning disability exist? Today there is a trend to label every student who is failing in school as learning disabled. As a result, learning disability classes have become a dumping ground for every student who is failing or a behavior problem. Now if one really wants to get a student in a learning disabilities class, all one has to do is find what the criteria are for placement in such a class and then select tests and conditions that will give the student the necessary profile to get into the class. Almost every student who is failing in school will show some type of problem or uneven development in information processing

skills. Furthermore, different visual and auditory skills develop unevenly and at different rates for different children. So when you start using a standardized test to look at these skills, you will, of course, see the student's relative position on certain skills in reference to a group's performance. The point is, everyone has varying styles of learning. Too often varying styles of learning are interpreted as learning disabilities. Here is what you can do informally with you observation skills before you jump to conclusions that the student is learning disabled.

First, select a novel task in reading, arithmetic and writing. Teach the student a lesson. Note how the student learns and check to see if he retains the information. Can he learn? Next, look at the student's past performance in school, look at his workbooks, report cards, etc. Do auditory, visual, motor, information processing deficits appear? Are there suggestions of hyperactivity, impulsivity, etc? Was there ever a time when the student functioned well academically? If so, what happened to cause the student to start failing? Did the student miss significant areas of instruction (e.g., phonics) as a result of illness? Did something tramatic (e.g., death of a parent) happen in the students life? These are significant variables that should be considered before a label of learning disabilities is attached to a student.

So far, we have considered the student's present academic performance, his past academic performance, and gaps in instruction which may or may not be affecting his present academic functioning. The teacher should now look at the student's intelligence test scores on an individual intelligence test and note the predicted or expected level of achievement in reading, arithmetic and spelling to see if there is a discrepancy between where the student is

functioning on a standarized achievement test and where he should be functioning. (Remember the student's past instruction is a critical variable to consider when doing this. One cannot expect a student to perform what he hasn't been taught.)

If the teacher does not have access to such expectancy tables, she can use the formulas of Harris, or Bond and Tinker to estimate a reading expectancy.

Now if you have observed or noted, via records, the student's past academic performance, his present academic performance, and his academic achievement is what would be expected, based on his intelligence quotient, then you need to reconsider if this student belongs in class for the learning disabled. If the student is functioning academically up to his predicted level and his past and present performance confirm this rate of functioning, then it is possible that he is functioning at his best level. Pushing the student further might create undesirable side effects. On the other hand, if the student shows potential and has perceptual or informative processing problems or specific behavioral problems (hyperactivity) then placement in a Learning Disabilities class is warranted. This factor should be documented by observation.

Parents often have unrealistic expectations of these children. By permitting the parents to observe their child's performance on a novel academic task, and pointing out the child's achievement in relation to his assessed academic potential, parents become more realistic in their expectations of their children.

The next question a teacher should be able to answer is: Where is the

student functioning in reading, arithmetic and writing? Often teachers assume that a student is functioning at a particular grade level in reading and arithmetic because he is in or has been in that grade or has scored at that grade level on an achievement test. Grade scores on traditional achievement tests rarely match the grade level marked on reading and math books. A teacher's observation of where a student is functioning on the hierarchical sequence of reading and math skills is critical to good teaching. I have seen teachers teaching a child to syllablize words when the student did not know the sounds of the letters in the alphabet. Some teachers expect students to draw inferences from reading material when the student cannot comprehend the details or main ideas of a story. Teachers must first know a hierarchical sequence of skills in reading and then by observation, pinpoint where the student in functioning. This can be done by giving a student selected tasks from a sequence of reading skills and then observing the student's performance on the skills.*

The same observational concept applies to the area of arithmetic. There is a definite hierarchical sequence to math skills. By observing what the student can do and cannot do along the basic sequence computational skills, teachers can pinpoint when a student is functioning. Furthermore, by observing the student's past and present work the teacher can spot patterns or errors. For example, one particular teacher I know complained that a student could not do multiplication problems involving two digits in the multiplier. Her

* Hierarchical Observational Inventories in Reading, Arithmetic, and Writing are available from Super Systems, P.O. Box 16299, Jacksonville, Florida 32216

approach was to give him many exercises with such problems. If she would have observed the student's pattern of errors, she would have noted that the student's errors were not due to an algorithm or muliplication error but due to errors of addition in the partial products. The student consistently errored when he had to add 6+9, 9+6, 7+6, and 6+7. Teachers need to observe patterns of errors in a student's past performance and present performance. By looking for patterns of errors, the teacher can make a more refined diagnosis.

The third question a teacher should be able to answer is: What auditory and visual deficits are interfering or hindering the learning processes? Teachers should be able to spot auditory and visual deficits in a student's daily school work. If the teacher sees a student manifesting a deficit consistently she can request formal testing to either confirm or refute her tentative diagnosis. In most cases, if the deficit appears in reading, it will appear in writing and arithmetic. For example, if a student reverses b's and d's in reading, he will often reverse 6's and 9's in arithmetic. Formal testing is not always necessary. In many cases such simple problems can be remediated without further testing or referral.

The fourth question the teacher should be able to answer is: How does the student learn best? By systemtaically observing a student, a teacher should be able to note how the student best takes in information and how he best expresses information. A teacher could try different approaches to the teaching of reading words and then observe and note how the student learns best. Simple behavior charting would be a valuable asset in this respect. Don't forget to ask the child how he thinks he learns best. Often we overlook this valuable source of information.

The fifth question a teacher should be able to answer is: Are there any specific aptitudes that can be used to help this student learn more efficiently? Some students have a good aptitude for memory but poor aptitudes for conceptualization. Other students will have good aptitudes for conceptualization but a poor aptitude for memory. Once the teacher observes a particular aptitude that is strong in a student, she should capitalize on this strength in formal instruction. On the other hand, the teacher can try to strengthen weak aptitudes.

The sixth question the teacher should be able to answer is: What will motivate the student? Generally students who have been failing in school are turned off about school and school tasks. An observant teacher should note what the student's interests are and try to employ them in the student's lessons.

The teacher should also note by observation what a student finds reinforcing--what he seems to like to do. By using the Premack Principle, the teacher can reinforce a low priority behavior (specific academic tasks) with a high priority behavior (what the student likes to do.)

The seventh question the teacher should be able to answer is: What behavior or behaviors are interfering with the student's academic functioning in school? Terms such as hyperactivity and impulsivity are too general in terms of describing behavior. The particular behavior that is a problem should be pinpointed and described in such a way that anyone reading or hearing the description would be able to mimic the behavior precisely.

Once a behavior has been delineated, the teacher can count it's occurance over a specified period of time for several days at the same time and place each day to obtain a baseline or pretreatment rate. Treatment

can then be introduced and compared to baseline data to see if there is an improvement. By using this approach no assumptions are made about the behavior one is dealing with, the treatment, and the results of the treatment, because all are observable and measurable.

Once a teacher can answer the above basic seven questions, she can neatly arrange her findings into a comprehensive educational prescription for the student. The beautiful part about this approach is that the teacher did not have to wait six weeks to a year for someone to come in and test the student. The teacher's observational diagnosis is based on school tasks, where as a diagnosis by an outsider using standardized instruments is only indirectly related to school tasks. Furthermore, by answering the above seven questions and programming the student in the line with the findings, it is highly probable that the student will make significant progress.

Before referring a student and risking the possibility of a permanent inappropriate label, I would like to encourage you to at least attempt this approach.

In closing, I would suggest that teachers learn what to look for, then look for it, and trust their observations.